Research Report 1386

Development of the Commander's Unit Analysis Profile (CUAP)

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ARI Field Unit at Fort Hood, Texas
Systems Research Laboratory

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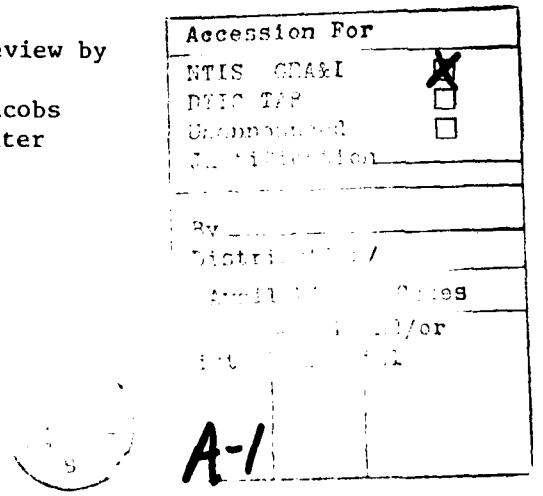

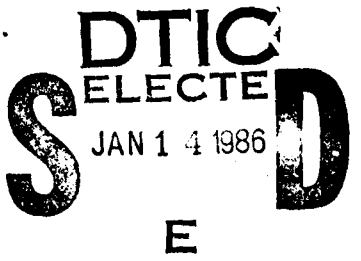

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The CUAP questionnaire is a diagnostic tool for providing Army commanders of company-size units a knowledge of their enlisted soldier's attitudes in Leadership, Discipline, Job Satisfaction, Morale, Reenlistment, etc. The questionnaire, which is completed in about 15 minutes, can be read by soldiers with minimal reading skills. Administration procedures require no special training and provide confidentiality for both the unit commander and the respondents. Only areas over which commanders exercise some control are covered. Timely, uncomplicated feedback to unit commanders is provided by two

ARI Research Report 1386

20. (Continued)

graphical unit profiles. Profile 1 depicts for each subject area a "Unit Factor Score," which is the unit's score in that area, and an "Average Score Other Units," which is the mean score for that area of all units recently utilizing the CUAP. Profile 2 depicts the "Unit Percentile Rank" of the unit for each area. The CUAP does not substitute for the commander's judgment in evaluating the mission readiness of the unit, but it does identify unit attitudes that may detract from or contribute to overall operational effectiveness. The CUAP is potentially useful not only to small-unit commanders, but to battalion and, to a lesser extent, brigade commanders as well. It is also applicable to the missions of inspectors general and the organizational effectiveness arena.

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DEVELOPMENT OF THE COMMANDER'S UNIT ANALYSIS PROFILE

FOREWORD

The identification by commanders of the perceptions and attitudes of their unit's soldiers is essential to proper leadership and administration of the unit. A commander cannot take remedial action until he first knows what areas are in need of improvement, and the nature of the problems in those areas. In turn, the operational effectiveness of a unit is dependent upon the ability of the commander to identify and rectify problem areas relating to training effectiveness, unit cohesiveness, job satisfaction and similar factors. In this respect, leadership and unit effectiveness are major areas of research concern to the Army Research Institute of the Behavioral and Social Sciences (ARI).

The present report discusses the Commander's Unit Analysis Profile (CUAP), a new diagnostic tool developed by the Fort Hood Field Unit of ARI for use by company level commanders. This report documents the development, validation, and utilization of the instrument to date and implications for additional research.

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TECHNICAL DIRECTOR

DEVELOPMENT OF THE COMMANDER'S UNIT ANALYSIS PROFILE (CUAP)

EXECUTIVE SUMMARY

Requirement

Unit commanders are charged with maintaining mission readiness and operational effectiveness. In company-size units, especially, this applies directly to the individual soldier. The small-unit commander thus needs to possess a good working knowledge of troop attitudes towards the aspects of living, working, and training in the unit that influence the quality of unit performance. However, there has been no ready way for commanders to acquire such information routinely, efficiently, and reliably. To meet this need--expressed in a request-for-research from HQ III Corps and FORSCOM--the CUAP was developed within the following guidelines designed to make it practical in practice as well as theory: The CUAP must . . .

- Function as a tool to "red-flag" unit strengths and weaknesses
- Be easy to administer and interpret
- Have a short administration time
- Be easy to read
- Possess face validity
- Provide confidentiality for respondents and commanders
- Deal only with subject areas under control of the unit commander
- Provide for rapid processing of data and feedback
- Be maximally sensitive to differences among company-size units
- Provide feedback in the context of Army-wide norms

Developmental History

The original questionnaire was created by adapting items, covering 23 subject areas, from a large pool of questions gathered from earlier research questionnaires. The questionnaire was administered to 675 soldiers in 21 tank companies. Statistical analysis of the data indicated that some items were redundant, misplaced, ambiguous, incapable of distinguishing among the 21 companies in the sample, or misplaced within the questionnaire. These items were clarified, eliminated, or relocated. A few new items were added.

Version 2 of the questionnaire was administered to approximately 3,850 soldiers in eight FORSCOM divisions and analyzed in the same manner as the original version. The 3rd edition, administered to a smaller sample of about 1,100 soldiers in 30 units from two divisions, was again similarly analyzed. The 4th edition was an 88-item questionnaire covering 21 basic subject areas. Army-wide norms were developed for this version which was administered to about 5,000 soldiers from FORSCOM and USAREUR. The current version is the same as the 4th edition with only very minor revisions.

The 21 subject areas covered by the CUAP are the following:

- Officer Leadership
- NCO Leadership
- Immediate Supervisor Leadership
- Leadership Concern for Soldier Welfare
- Promotion Policy
- Rewards & Corrective Actions
- Leave & Pass Policies
- Quality of Training
- Tools, Equipment, & Supplies
- Job Satisfaction
- Freedom from Harassment
- Military Courtesy & Discipline
- Race Relations
- Unit Cohesiveness
- Sports Activities
- Social Activities
- Freedom from Alcohol/Drug-Related Problems
- Food
- Confidence in Unit
- Morale
- Reenlistment Potential

Reliability and Validity

The test-retest reliability of the CUAP, based upon scores of individual respondents, was .78 ($p < .001$). Based upon unit scores (averages), it was .90 ($p < .001$). Predictive validity was examined in several ways: In one study, for example, there was 78 percent agreement between the rank order of participating units as established by the CUAP and the subjective orderings made by battalion commanders. In another study, the top-scoring CUAP unit was able to take 14 of 15 tanks to the range and bring 14 back. The low-scoring unit could take only 5 of 15 tanks to the range and bring 1 back.

Feedback

Confidential feedback to unit commanders is provided in two profiles. Profile 1 shows the unit's scores in the 21 subject areas along with the average for other units recently utilizing the CUAP. Profile 2 depicts for each area the unit's percentile rank among all the units. A computer printout with summary statistics for each of the 88 items on the questionnaire is also provided to each company-level commander. At the request of battalion, brigade, or division level commanders, a higher level profile can be "rolled up" while still maintaining the anonymity of the company-level units.

Utilization

The CUAP is a diagnostic leadership tool for pin-pointing operational strengths and weaknesses in company-size units. During its developmental stages, valuable feedback (based on administrations to over 13,000 soldiers) was provided to almost 300 commanders. The questionnaire, which customarily takes about 15 minutes to complete, can be used by virtually every company- and battalion-level commander in the Army. (Its direct usefulness diminishes as feedback is averaged for higher level commands.) It has been used also by inspectors general and organizational effectiveness officers and could become a valuable adjunct in their work. Finally, it paves the way for commanders to increase the effectiveness of their units through better insight into the mission-related liabilities and assets associated with the attitudinal and social environments of their units.

DEVELOPMENT OF THE COMMANDERS UNIT ANALYSIS PROFILE (CUAP)

CONTENTS

DEVELOPMENT OF THE COMMANDER'S UNIT ANALYSIS PROFILE (CUAP)

The Commander's Unit Analysis Profile project was begun in late 1978 in response to a request-for-research from U.S. Army Forces Command and Headquarters III Corps and Fort Hood. The project was concerned with leadership in company-size Army units and addressed the problem that while the mission readiness of a unit can sometimes be greatly affected by various attitudinal and social problems in the unit, there did not exist a satisfactory, standardized method for commanders to identify unit attitudinal and social liabilities and assets. Thus, these commanders, charged with maintaining constant mission readiness, needed a diagnostic device to help them "red-flag" possible unit problems and identify unit strengths and weaknesses associated with the attitudinal and social climates of their units.

Purpose

The purpose of the project described here was to create just such a device--the CUAP, a leadership tool that would provide an accurate profile of troop attitudes in areas such as quality of unit leadership and training, job satisfaction, ethnic group relations, unit cohesiveness, soldier confidence in the unit, morale, reenlistment potential, and so on--areas intricately related to mission readiness and operational effectiveness, but with which commanders are sometimes not adequately familiar, especially from the perspective of the unit's "rank and file." The primary objective was to devise a simple, retribution-free, unit-diagnostic evaluation system that would efficiently provide the small-unit commander substantial but concise information about the attitudinal and social environment of the unit.

In addition, in order to maximize practical value, such an evaluation system would have to address five major problems commonly encountered in surveying Army personnel:

- Many surveys and questionnaires administered within the Army are too long; they interfere unnecessarily with the primary mission, which is training.
- The language and format of many questionnaires is too complex for some soldiers to read and understand easily.
- Useful feedback is rarely provided to commanders, particularly at the company level.
- When feedback is occasionally provided to commanders, it commonly arrives months after the survey was conducted and is therefore so outdated that it is of little value.

- For current questionnaires there is ordinarily no way for commanders to determine how their units compare with other Army units; i.e., usable norms are unavailable.

Method and Results

Developmental criteria. The criteria imposed upon the CUAP to deal with the problems just cited (and related problems) were the following:

- The questionnaire shall be easily administered and the results easily interpreted without specially-trained personnel.

- The administration time shall be short, requiring minimal interference with scheduled training.

- The instrument shall be written in easy-to-read language that can be understood by virtually all soldiers, including those with minimal reading skills.

- Subject areas covered shall be only those over which the junior commander can exercise direct influence. (Of little or no value for present purposes would be questions about Army pay, reenlistment bonuses, uniform design, DA policies, and the like, because the junior commander has no authority to effect change in these areas.)

- The questionnaire shall utilize a response format that facilitates rapid data processing and timely feedback to commanders (10 to 15 days).

- The feedback shall permit commanders to compare their unit profiles to the combined profiles of other Army units. (This is an important criterion because, for most practical purposes, the scores made by a unit are of little value to the commander unless they can be compared to the scores of other units. For example, the fact that a sizeable percentage of the junior enlisted personnel in a unit do not wish to reenlist may not be unsatisfactory if the unit's reenlistment rate is comparable to that of the average unit.)

- The administration and processing procedures shall provide complete confidentiality for the respondents and for unit commanders who voluntarily request the survey in their units.

- While the survey shall be a tool for isolating and identifying underlying factors that contribute to or detract from mission readiness, it shall not be construed as replacing the commander's responsibility for assessing and controlling the overall operational effectiveness of the unit.

- The questionnaire items shall possess face validity; their meaning shall be obvious, and there shall be no so-called "double-meaning" or "trick" questions.

- The questionnaire shall be maximally sensitive to differences between company-size units; it shall not contain items that both "good" and "bad" units answer similarly nor questions that deal expressly with higher level commands.

Developmental procedure. In the initial development stage, questionnaire items from a variety of personnel-related questionnaires were assembled and pooled together. Sources included organizational effectiveness questionnaires (e.g., the GOQ), the Modern Volunteer Army and VOLAR questionnaires, the Command Climate and Quality-of-Life surveys, drug and alcohol-abuse questionnaires, and questionnaires from the other services. (It is noteworthy that although most of the questions seemed "face-valid," evidence pertaining to their predictive validity and reliability was predominantly absent.)

The first step in reducing this large pool of items was to eliminate all questions dealing with subjects over which the company-level commander has no direct control--opinions about Army pay, uniforms, and the like. Other items were eliminated because they were not pertinent at company level or to enlisted personnel or were simply irrelevant to the project objectives.

The remaining items were sorted into 13 separate topic areas. As expected, there was much overlap of content among the questions within each area. Numerous items from different sources asked the same questions phrased in different ways. Consequently, the number of items in each topic area was reduced by integrating similar items into single items and formulating them in accordance with the format intended for the CUAP questionnaire. (In very few instances was an item used exactly as it was originally written.) In developing the content areas, an attempt was made to cover all major topics thought to be important to the effective operation of company-size units and which enlisted personnel would find salient in their everyday lives.

From this procedure evolved an initial pilot questionnaire consisting of 99 items formulated as interrogatives with five-alternative, evaluative response scales--as in the fictitious example shown in Figure 1.

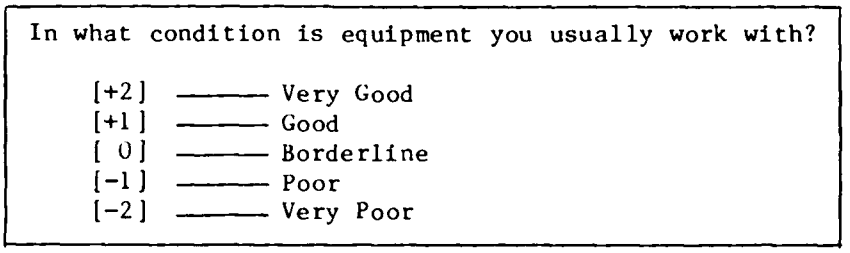

Figure 1. A fictitious CUAP item, illustrating the format and type of response scale employed.

The items were not randomly ordered within the questionnaire but intuitively arranged by topic group--a procedure that could be viewed as inviting a response-set bias. However, for the purposes at hand, it seemed desirable to focus respondents on one general topic at a time and to allow the topics and

the several questionnaire items pertaining to each topic to flow in a related sequence throughout the questionnaire.

This pilot version of the CUAP questionnaire was administered to 674 soldiers in 21 tank companies at Fort Hood. The data were factor analyzed,[1] and the analysis yielded 23 groups of items (factors) that were quite similar in content to the topic areas that had been created intuitively. (This similarity was expected because of the substantial face validity inherent in the items.) On the basis of this analysis items were eliminated that appeared related to more than one topic area or were not significantly related to any of the topic areas. The purpose was to eliminate overlap among topics and to rid the questionnaire of items that did not appear to make a worthwhile contribution to the particular area they were intended to measure.

The original grouping of the questions was then revised wherever the analysis indicated that the intuitively created structure was wrong, but care was taken to maintain the face validity of each item within each factor. This step necessitated the throwing away or revising of a few items because they did not seem to fit (in terms of face validity) where the analysis put them.

A second analysis was then conducted to eliminate items that did not distinguish among the 21 military units in the sample. In other words, those items that the participating units tended to answer the same way were eliminated. This procedure was to serve the previously stated objective of creating an instrument whose primary use would be to measure differences among units. Specifically, a one-way analysis of variance was conducted on the data from each of the 99 questionnaire items, and those items were eliminated for which there was not a statistically significant difference at the .01 level among the 21 companies. A few items that failed to reach the .01 level in this analysis, but nevertheless "showed promise," were retained, with revisions, when they were needed for a factor that was running short of items because of the item elimination process.

A third analysis was conducted to eliminate undue redundancy from the questionnaire: Where two items were highly correlated (.70 or greater), the less desirable of the two, either statistically or otherwise, was usually eliminated. In addition, some items were eliminated because of unforeseen format inconsistencies and the like.

The remaining items were then factor analyzed again and reorganized accordingly. In this analysis some of the original factors collapsed together as a consequence of the previous item eliminations, leaving 13 factors. A number of these factors were then subdivided into two or three separate "factors," or subject areas, when their content provided a logical basis for the division and there were external reasons for making the division. For example, all the questionnaire items related to sports and social activities emerged as a single factor in the analysis, yet the distinction between sports

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[1]Further details pertaining to the analyses described in this report are available upon request.

and social activities was maintained because of its potential importance to unit commanders. This subdividing produced 23 subject areas once again. At this point, several new questions were added to "round out" some of the factors, and items were reworded wherever it seemed improvements in readability or clarity could be effected.

The resulting version of the questionnaire, CUAP8004, was administered to 3,852 soldiers in eight FORSCOM divisions, and the data were analyzed in a manner essentially identical to that used with the original pilot version. These analyses resulted in more refinements and another new 96-item instrument that was pilot tested on 30 companies. The number of soldiers in the sample was 1,123.

Once again the data were subjected to the same type of analysis. Several refinements were made, which yielded CUAP8108, an 88-item questionnaire covering 21 general topics. CUAP8108 was administered to aproximately 100 company-size units and about 5,000 soldiers from FORSCOM and Europe. The new norms that emerged were very similar to those for earlier versions. (The current version of the CUAP questionnaire is 8301A, which is identical to 8108 except for a few minor wording changes.)

Feedback to commanders. Two graphical profiles were created for providing feedback to unit commanders. Profile 1 (Figure 2) depicts "Unit Factor Scores," indicated by the open triangles. These scores, which can run from -100 to +100, indicate how positive or negative the unit's standing is in each subject area. Negative 100 is, of course, the lowest (worst) possible score, and +100 is the highest (best). A score of zero would indicate "borderline" or "in-between." Profile 1 also shows for each area the "Average Score (for) Other Units," indicated by the black arrowhead. This is the average score for all units recently utilizing the CUAP. This average allows the commander to compare the unit's score in each area with the combined average for all other units. The factor-score profile shown in this figure is the actual profile for one of the highest-scoring units observed. Figure 3 shows the factor-score profile for one of the lowest-scoring units observed.

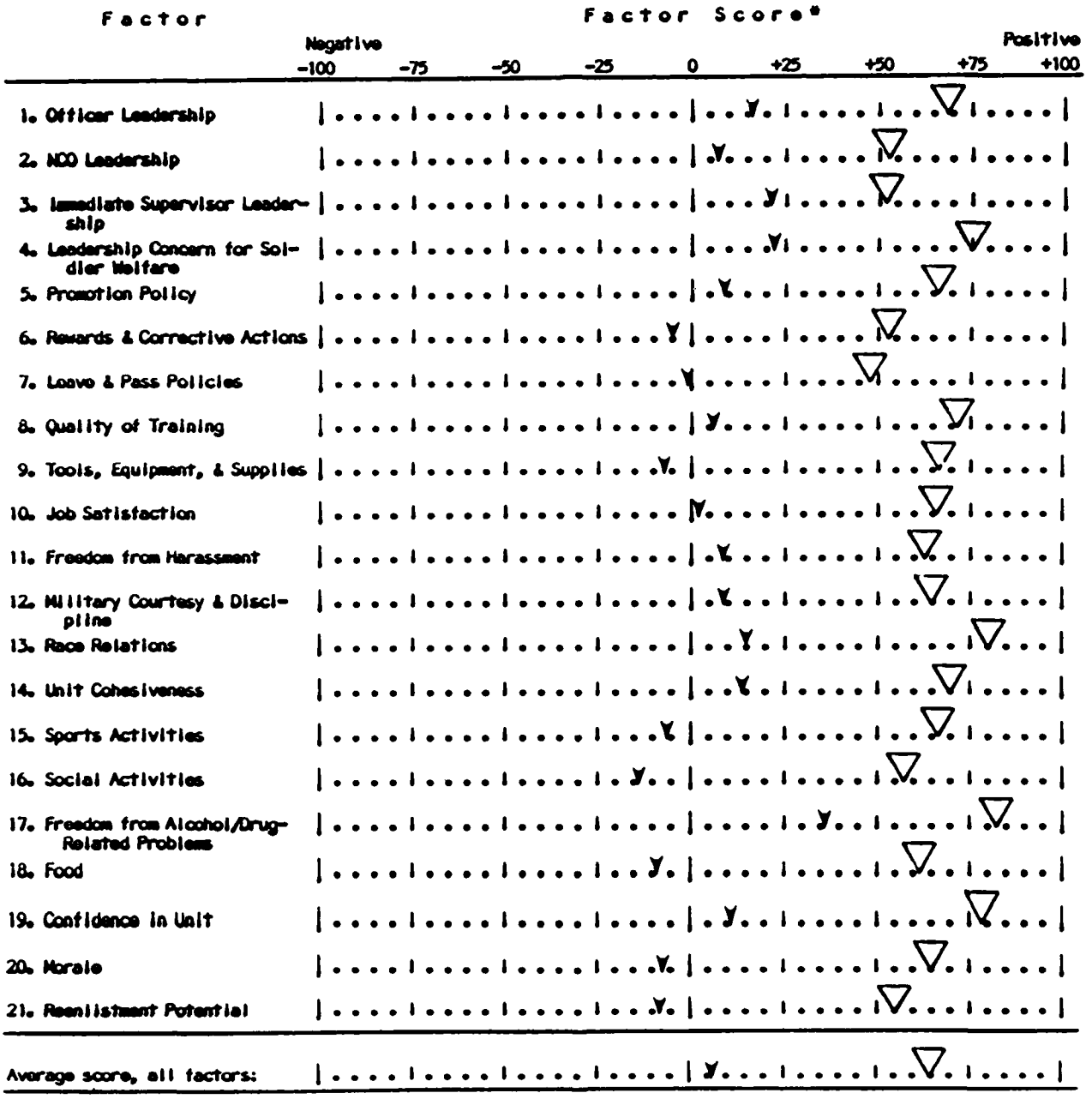
The second type of feedback profile provided to commanders depicts a "Unit Percentile Rank" for each area, which tells the commander what percentage of other Army units have received lower (or equal) Unit Factor Scores in each area. Figures 4 and 5 show the percentile profiles for the same high- and low-scoring units.

Reliability. Table 1 displays the results of a test-retest reliability study with a sample of 26 soldiers from one company. The two CUAP administrations were one week apart. As shown, the correlation between the administrations was .78 ($p < 001$).

Because a primary objective for the CUAP was to differentiate consistently among units in addition to individual soldiers, a reliability study that treated 13 companies as individuals was also conducted (Table 2). This time the administrations were three months apart. The test-retest reliability

C O M M A N D E R ' S U N I T A N A L Y S I S P R O F I L E [1]

Unit ID XXXX Date OCTOBER 1981



*Key: ▽ Unit Factor Score

Y Average Score Other Units

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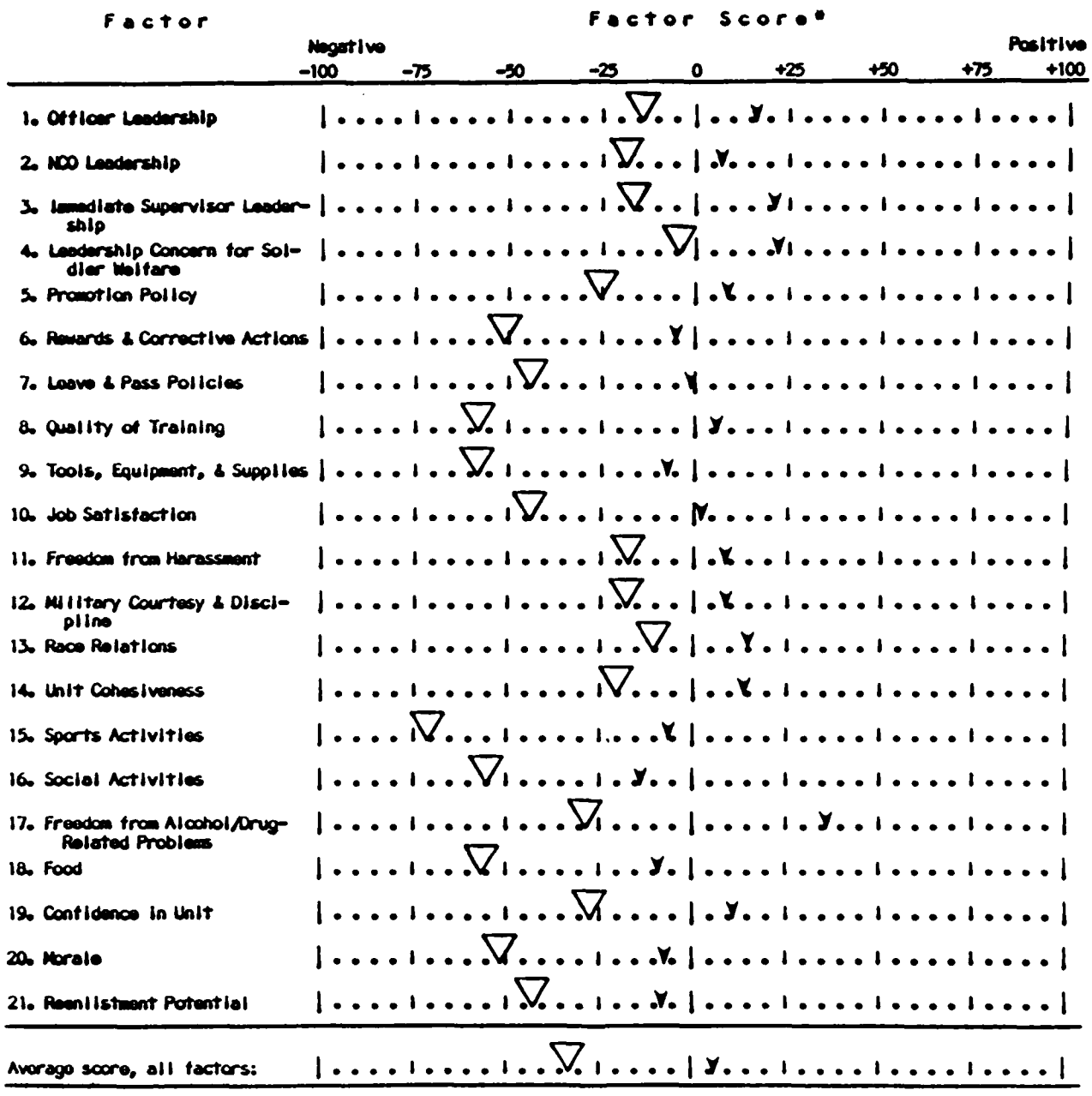
Figure 2. Unit factor score profile (high-scoring unit). [CUAP810BH18]

C O M M A N D E R ' S U N I T A N A L Y S I S P R O F I L E [1]

Unit ID YYYY Date OCTOBER 1981



*Key: ▽ Unit Factor Score

▼ Average Score Other Units

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Figure 3. Unit factor score profile (low-scoring unit). [CUAP810BH18]

COMMANDER'S UNIT ANALYSIS PROFILE [2]

Unit ID XXXX Date OCTOBER 1981

Factor	Unit Percentile Rank* 0 10 20 30 40 50 60 70 80 90 100
1. Officer Leadership	▽
2. NCO Leadership	▽
3. Immediate Supervisor Leadership	▽
4. Leadership Concern for Soldier Welfare	▽
5. Promotion Policy	▽
6. Rewards & Corrective Actions	▽
7. Leave & Pass Policies	▽
8. Quality of Training	▽
9. Tools, Equipment, & Supplies	▽
10. Job Satisfaction	▽
11. Freedom from Harassment	▽
12. Military Courtesy & Discipline	▽
13. Race Relations	▽
14. Unit Cohesiveness	▽
15. Sports Activities	▽
16. Social Activities	▽
17. Freedom from Alcohol/Drug-Related Problems	▽
18. Food	▽
19. Confidence in Unit	▽
20. Morale	▽
21. Reenlistment Potential	▽
Average percentile rank, all factors:	▽

*Percentage of other units receiving lower (or same) Unit Factor Scores

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Figure 4. Percentile rank profile (high-scoring unit). [CUAP81C8]

COMMANDER'S UNIT ANALYSIS PROFILE [2]

Unit ID YYYY Date OCTOBER 1981

Factor	Unit Percentile Rank* 0 10 20 30 40 50 60 70 80 90 100
1. Officer Leadership	▽
2. NCO Leadership	▽
3. Immediate Supervisor Leadership	▽
4. Leadership Concern for Soldier Welfare	▽
5. Promotion Policy	▽
6. Rewards & Corrective Actions	▽
7. Leave & Pass Policies	▽
8. Quality of Training	▽
9. Tools, Equipment, & Supplies	▽
10. Job Satisfaction	▽
11. Freedom from Harassment	▽
12. Military Courtesy & Discipline	▽
13. Race Relations	▽
14. Unit Cohesiveness	▽
15. Sports Activities	▽
16. Social Activities	▽
17. Freedom from Alcohol/Drug-Related Problems	▽
18. Food	▽
19. Confidence in Unit	▽
20. Morale	▽
21. Reenlistment Potential	▽
Average percentile rank, all factors:	▽

*Percentage of other units receiving lower (or same) Unit Factor Scores

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Figure 5. Percentile rank profile (low-scoring unit). [CUAP8108]

Table 1

Reliability of Individual Respondent Scores[a]

Respondent	Test	Retest
	[----- 7 days -----]	
1	65	52
2	63	62
3	35	26
4	32	51
5	31	23
6	26	39
7	26	23
8	25	10
9	23	14
10	23	13
11	23	5
12	21	16
13	20	15
14	15	11
15	13	14
16	12	22
17	11	16
18	10	4
19	6	-2
20	5	6
21	4	-12
22	1	-1
23	-3	2
24	-10	22
25	-15	13
26	-18	-13
Company Average:	10	11

Note. Possible range of scores: -100 to +100).
[a]Correlation = .78 ($p < .001$).

Table 2

Reliability of Company Averages[a]

Company	Test	Retest[b]
	[---- 3 months ----]	
1	65	65
2	17	2
3	12	33[c]
4	10	11
5	8	-2
6	6	7[c]
7	4	7
8	4	3
9	2	7
10	2	-1[c]
11	-3	-5[c]
12	-4	3[c]
13	-7	-15[c]
Overall Average:	9	9

Note. Possible range of scores: -100 to +100.
[a]Correlation = .90 ($p < .001$).
[b]For company 4, the test-retest interval was 7 days.
[c]Company commander changed between test and retest.

coefficient was .90 ($p < .001$). Note also that the across-unit average remained the same from the first to second administration.

Validity. The validity of the CUAP, based upon the latter reliability figure could be as high as .95 (because, statistically, the validity coefficient can be as high as the square root of the reliability). But owing to constraints of the "real world," determining validity coefficients for command-climate and operational-effectiveness questionnaires, such as the CUAP, is usually considerably more difficult than determining reliability. In the present case, data pertaining to the traditional "command indicators" of military unit status could not be used because they were sparse and statistically contaminated. Some examples are these: (a) AWOLs are reported by some military units the first day after the soldier is missing, while others wait up to three days; (b) unit gunnery scores may be anywhere from a few days to months old, because one company may have gone to the gunnery range six months ago, another three, and another last week; and (c) commanders differ widely in the use of Article 15--what might draw an ordinary reprimand in one unit might draw an Article 15 or a summary court martial in another.

Although the use of traditional readiness indicators was not suited to the present purpose, other indications of validity were observed. For example, that the highest-scoring unit on the CUAP at the time had been able the previous month to move 14 of their 15 tanks to the gunnery range and return with 14, while the worst-scoring unit (which, coincidentally, happened to be in the same battalion) had, primarily because of maintenance problems, been able to move only 5 of their 15 tanks to the range and bring 1 back. Several weeks later, the same top-scoring unit was independently chosen by their division headquarters to receive the Draper Award for being the most outstanding armor unit in the division.

Other indications of CUAP validity came from unit assessments made by higher-level commanders. In connection with the administration of an early version of the CUAP, both brigade and battalion commanders were asked to rate the quality of each of the participating companies in their commands, and, in most cases, substantial agreement with the CUAP results was obtained.

More recently, after administering the CUAP in four battalions, each batallion commander was asked to compare all companies in the battalion with one another. The results, depicted in Table 3, show the battalion commanders agreeing with the CUAP in 22 out of 29 comparisons, or 76 percent of the time. It is relevant to note here that among those instances in which the CUAP and the commander disagreed, the overall CUAP scores of the two companies in question were, on the average, very close together or approximately equal--which would be expected on the basis of the notion that it is easier to distinguish between dissimilar entities than similar entities. The correlation between the CUAP scores and the commanders' ratings was .72, which seems relatively high considering the subjective nature of the commanders' ratings.

Establishment of Norms. After implementation of the CUAP, the development and maintenance of norms should be a continuing process in which updating (based upon a representative, Army-wide sample of units) occurs annually or

Table 3

CUAP Validity: Do Battalion Commanders Agree with the CUAP?

Comparison				Commander			
	Unit		Unit	I[a]	II[a]	III[b]	IV[c]
1.	A	vs.	B	Yes	Yes	Yes	Yes
2.	A	"	C	Yes	Yes	Yes	No
3.	A	"	D	Yes	No	Yes	Yes
4.	A	"	E	Yes	No	Yes	.
5.	B	"	C	Yes	Yes	Yes	.
6.	B	"	D	No	Yes	Yes	.
7.	B	"	E	No	Yes	.	.
8.	C	"	D	Yes	Yes	.	.
9.	C	"	E	Yes	Yes	.	.
10.	D	"	E	No	No	.	.
Percent Agreement:				70	70 (Overall: 76)	100	67

[a]CUAP administered to all 5 units in this battalion.
[b]CUAP administered to only 4 units in this battalion.
[c]CUAP administered to only 3 units in this battalion.

semiannually. On the assumption that the CUAP would be administered to a wide selection of Army units during any given time frame of sufficient duration (say, six months), updated norms could be easily generated from the data gathered during the previous time frame.

In addition, research is needed to determine whether important differences exist among norms for different types of company-size units. If, for example, artillery batteries were found to differ from tank companies, two sets of norms could be derived. Or, if norms for a particular type of unit were needed, one or more units of the type specified could be sampled without difficulty by having organizational effectiveness officers administer the questionnaire to preselected units in their divisions. These officers would then forward the data to the CUAP processing agency where they would be computer processed and the new norms generated. (On the other hand, the data would quite likely already be available at the processing agency from the data collected during the previous time frame.)

Development summary. The development of the CUAP has produced a multiple-choice, paper-and-pencil questionnaire for administration to enlisted personnel in grades E1 through E6. It is written in easy-to-read language that can be read and understood by soldiers with minimal reading skills and requires no special training for administrators. It can be administered by one person to as many as three company-size units at one sitting, and two persons can administer it to an entire battalion. No specific training is required to either administer the questionnaire or interpret the results. The total time required for seating respondents, reading instructions, and administering and collecting completed questionnaires is usually about 30 minutes. (The questionnaire itself is typically completed in about 15 minutes.) Confidentiality is provided for the respondents and any unit commander who voluntarily requests the survey. The data are collected and processed with a format that permits rapid feedback to commanders that is relevant, timely (customarily occurring within 15 days), and easily understood. The feedback shows the unit's status in 21 subject areas impacting on mission readiness. And for each area it indicates whether the unit's performance is positive or negative and how it stacks up against other units in the Army.

Conclusions

All in all the CUAP has to date been administered to almost 300 company-size units and about 13,000 soldiers in FORSCOM and USAREUR. This experience has surfaced a variety of uses not originally foreseen. The CUAP was originally viewed as a diagnostic instrument that would be used voluntarily and confidentially by the commanders of company-size units to highlight company strengths and weaknesses and, in particular, to pin-point problem areas that were in need of immediate attention. Furthermore, it was viewed as having special usefulness for newly-assigned commanders coming into units with which they are unfamiliar.

The CUAP continues to be viewed in this light. However, as the project has developed, both organizational effectiveness officers and inspector generals have seen the CUAP as a potential tool for use in their work. In fact, on

several occasions division and corps IGs have administered the CUAP in conjunction with IG inspections; and one proposed alternative for utilization is that the CUAP be administered routinely in conjunction with all IG inspections of company-size units.

However, probably the greatest interest in utilization of the CUAP has been shown by brigade and battalion commanders who desire to use the instrument to pin-point problem areas in the units under their commands and as a tool for counseling their subordinate commanders. But there is also a division of opinion here. Some battalion commanders want to require each of their units to take the questionnaire and have the feedback sent directly to the company-level commander. (In this case, battalion commanders would not see the results for the individual units in their commands and would, therefore, not be able to use the CUAP as an instrument for evaluating the relative effectiveness of their subordinate commanders.) By far the more preferred approach by brigade and battalion commanders, however, is to require the units to complete the questionnaire and have the results fed back to themselves. They, in turn, would pass the results on to subordinate commanders in counseling sessions. This procedure would not seem appropriate across the board--that is, as the modus operandi for the CUAP--although it would probably have significant usefulness under certain circumstances.

It is obvious, then, that the CUAP has a variety of potential uses. But the question, Which approach toward utilization would be most profitable to the Army? is perhaps moot: Each approach seems potentially viable within its context. Irrespective of the several possible utilization formats, the CUAP project offers the Army a simple, retribution-free, unit-diagnostic evaluation system that efficiently provides the small-unit commander substantial but concise information about the attitudinal and social environment of the unit.

In retrospect, it is apparent that few, if any, other Army instruments for evaluating unit status or soldier attitudes have gone through the analytical development process that the CUAP has. Indications are that it is a sufficiently reliable and valid instrument (although more research would be desired in these areas), and no other available instrument or combination of instruments meets the desirable criteria met by the CUAP. Again, it is not intended to replace the commander's ultimate responsibility for evaluating mission readiness; rather it can serve as a useful tool for isolating and identifying underlying factors that detract from or contribute to overall unit operational effectiveness.

Future research (prior to formal adoption of the CUAP as an operational instrument) should be directed at acquiring more validity data from longitudinal studies. This will require assessment of improvement on item clusters (factors) following differential feedback to commanders with regard to cluster scores by their units.